





Before you fire up the grill this summer, bear in mind that most of the foodborne illnesses associated with *Salmonella* and *E. coli* O157:H7 usually happen between July and September. These summertime illnesses are often linked to barbecues or picnics where meat is improperly stored, handled, or cooked. Bacteria that cause illness do not take vacations and can grow in foods if you are not careful.

Following the proper meat handling tips found in this brochure will help you keep your summer safe from bacteria that can cause foodborne illnesses.

**All people are susceptible to foodborne illness, but some people are at increased risk of serious illness.**

These people include:

-  babies and young children;
-  pregnant women;
-  senior citizens; and
-  people on antibiotics or with long-term health problems like cancer, AIDS, and diabetes.

## **Cleaning and Sanitizing**

Cleaning is important to remove germs on counters and equipment used for food preparation. Wash and rinse the surfaces of counters, cutting boards, and utensils with soap and water. For added safety, you may also sanitize the clean surfaces.

### **Sanitizing:**

A sanitizing solution, like bleach and water, is used to destroy germs that remain on surfaces after cleaning with soap and water. Clean and sanitize any item that has touched raw meat.

### **To prepare a bleach and water sanitizer:**

mix 1 teaspoon of bleach per  
gallon of cool water.



*Note: Use cool water, because hot water will speed the rate of bleach evaporation. Also, do not add soap to the water--the mixture won't kill germs as well.*

## **Safe Handling of Raw Meat**

Raw meat must be handled and stored safely to prevent bacteria from growing to unsafe numbers, and to make sure bacteria from raw meat are not spread to other foods.

### **While shopping**



Make the grocery store the last stop before home. Pick up meats and other refrigerated or frozen items last.



Place raw meat in separate plastic bags to protect other items from dripping blood and juices.



Store refrigerated foods in an ice chest if it will take longer than an hour to get home.

### **At home**



Set refrigerator temperature to keep perishable foods, including meat, below 41°F and freezers to keep foods at 0°F or colder.



Place perishable items in the refrigerator or the freezer immediately when you get home.



Store raw meat in a plastic or glass container below all other foods in the refrigerator so that other food items are protected from dripping blood and juices.



Refrigerated raw meat and poultry should be cooked or frozen within 1-2 days.

### **Away from home**



Use an insulated cooler to keep meat cold. Keep the meat in water-tight containers that will not drip. Layer the foods with ice. Use enough coolers to keep all raw meat away from other foods.

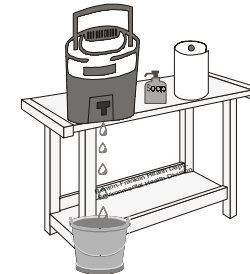


Remember, loose ice used to keep the food cold should not be used in drinks.

## **Safe Preparation of Raw Meat**

### **Food safety begins with handwashing.**

If you do not have a sink, you can set up a temporary handwashing station.



Fill a thermos or jug (that has a spout) with warm water.

Set the thermos on a table and place a catch bucket underneath it.

Remember to take soap and paper towels.

### **Protect all food items from meat blood or juice.**

- **Wash your hands** after handling raw meat so you do not cross-contaminate other items with bacteria from the raw meat.
- Use **separate utensils, plates and cutting boards** for raw meats and produce.
- **Wash and sanitize all utensils** which have touched raw meat before using them for other foods.
- If you will use the raw meat marinade as a serving sauce, **heat the marinade to a rolling boil** for at least 1 minute first.

### **Keep the meat cold until you are ready to cook.**

- **Defrost frozen meat in the refrigerator** or under cold running water. It is not safe to thaw meat on the kitchen counter--bacteria can multiply in the outer layers before the inner layers are thawed.
- **If you defrost in the microwave**, cook the food immediately.
- **Marinate raw meat in the refrigerator.**

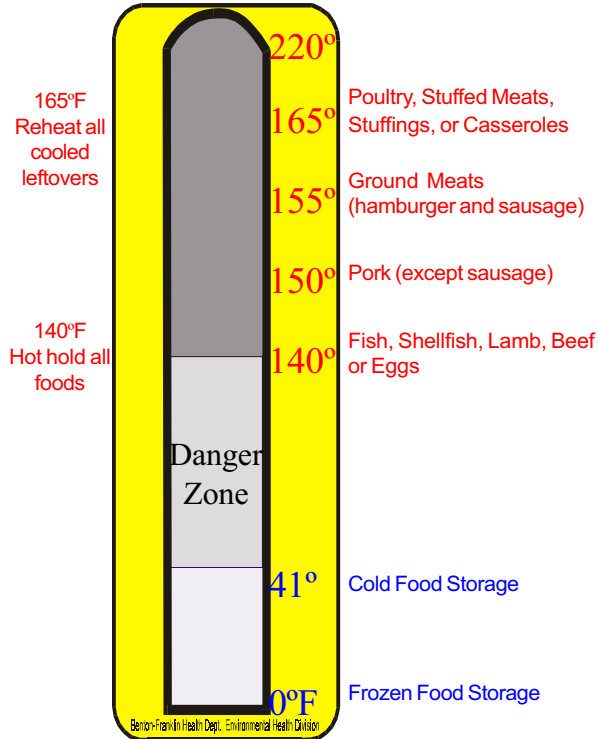


## Barbecue Temperature Tips

Raw meat products should be cooked thoroughly to kill harmful bacteria and parasites that might be present and can cause illness.

Use a metal-stem thermometer (that can measure from 0-220°F) to ensure meat has reached its recommended minimum internal temperature.

Metal-stem thermometers can be purchased from restaurant supply companies or from department stores. Look for thermometers that can be calibrated--they should have an exposed nut where the stem meets the dial. Follow package directions for use.



**Use your thermometer to verify hot and cold food safety temperatures.**

## More Barbecue Tips

**You can also follow these recommendations to check if the meat is cooked thoroughly:**

- Fish should be cooked until it flakes with a fork.
- Beef and pork should be cooked until all the pink is gone. Cook ground beef patties until juices run clear and the inside of the patty is no longer pink.
- Poultry should be cooked until there is no red in the joints, and juices run clear.
- During grilling, turn meats at least twice and flatten with a spatula to burn off excess blood.
- After barbecuing, refrigerate leftover foods or place in ice storage immediately. Separate into small portions for faster cooling.
- Perishable food should not be left out over one hour in high summer heat (85°F or above).

---

### For more information, contact:

#### Benton-Franklin Health District

800 W. Canal Dr.  
Kennewick, WA 99336  
(509) 582-7761 x246  
[www.bfhd.wa.gov](http://www.bfhd.wa.gov)

#### W.S.U. Cooperative Extension

5600E W. Canal Place  
Kennewick, WA 99336  
(509) 735-3551

#### Additional BFHD brochures on similar topics:

*E.coli* O157:H7  
Picnic Safety  
Potluck Safety  
Do I Have a Foodborne Illness?  
*Salmonella*

BFHD-E-0014 06/01

# BBQ Food Safety

**outdoor tips series**



Benton-Franklin Health District, Environmental Health Division 02/03

[www.bfhd.wa.gov](http://www.bfhd.wa.gov)

